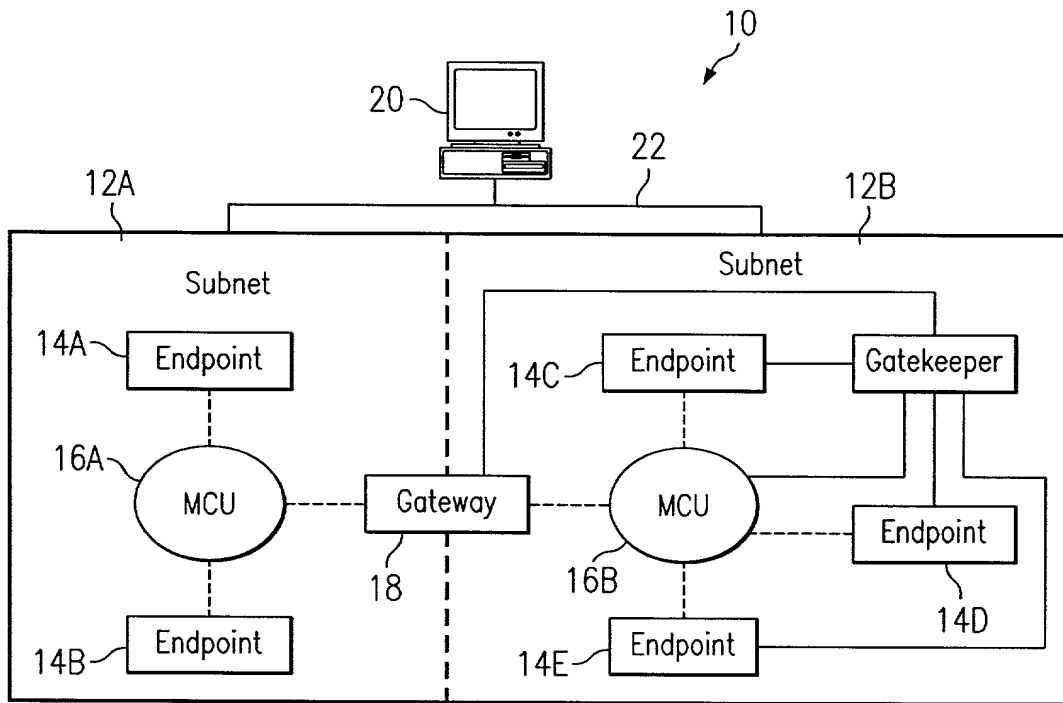*"System and Method for Discovering Devices in a Video Network"*
Inventors: Jayanta Tewari et al.
Atty Docket: 021556.0136

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FIG. 1

DEVICE ID	IP ADDRESS	PROTOCOL	DEVICE TYPE	VENDOR	MODEL
D−14A	10.0.0.1	SNMP	Endpoint	VTEL	Galaxy SL
D−14B	10.0.0.10	Telnet	Endpoint	ACME	XB−32
D−16A	10.0.0.9	HTTP	MCU	VTEL	MCU−II
D−18	10.0.0.3	SNMP	Gateway	VTEL	Galaxy XL
D−18	10.0.0.4	SNMP	Gateway	VTEL	Galaxy XL
D−20	10.0.0.5	VT−100	Gatekeeper	Illudium	Q−36
⋮	⋮	⋮	⋮	⋮	⋮

FIG. 2

"System and Method for Discovering
Devices in a Video Network"
Inventors: Jayanta Tewari et al.
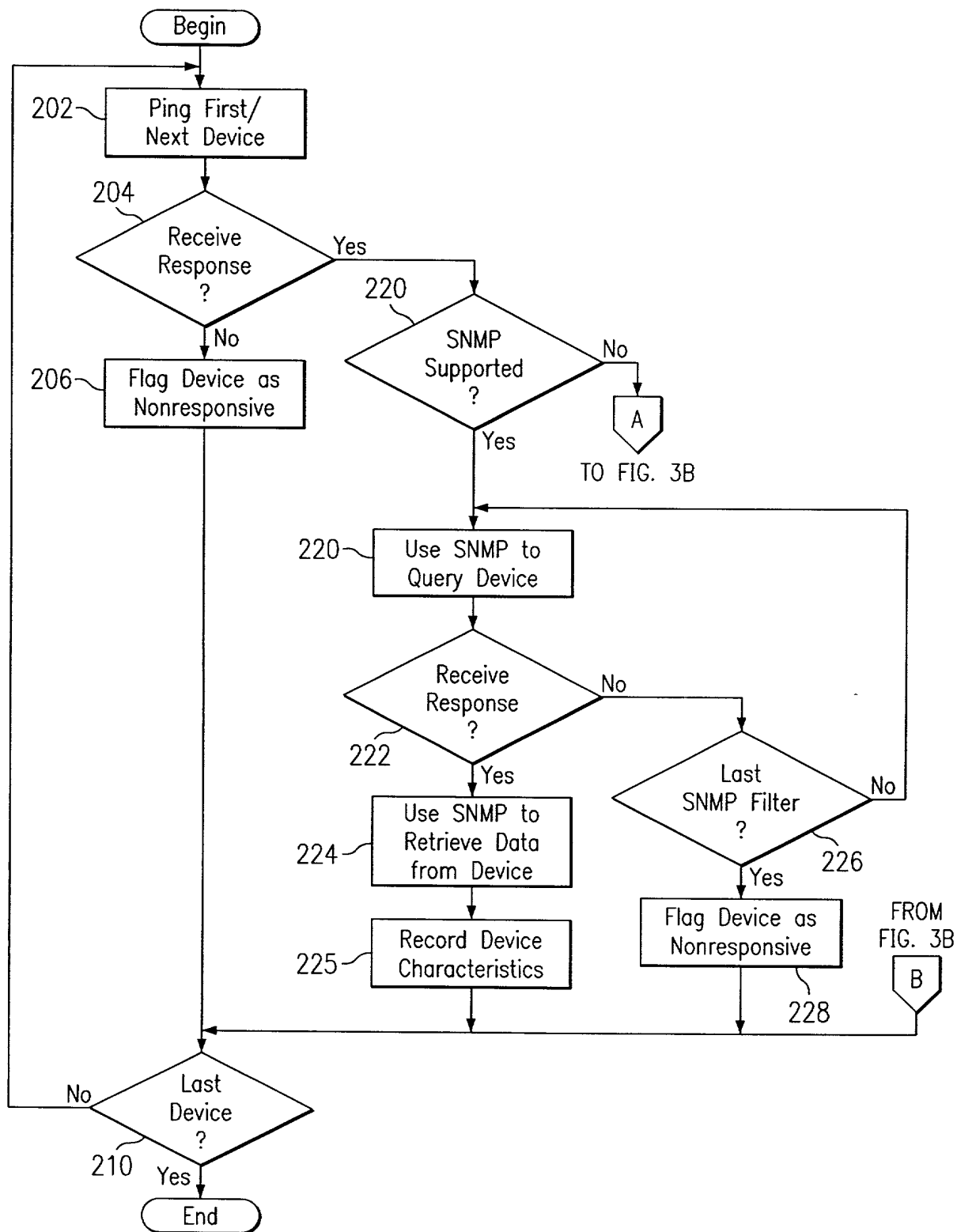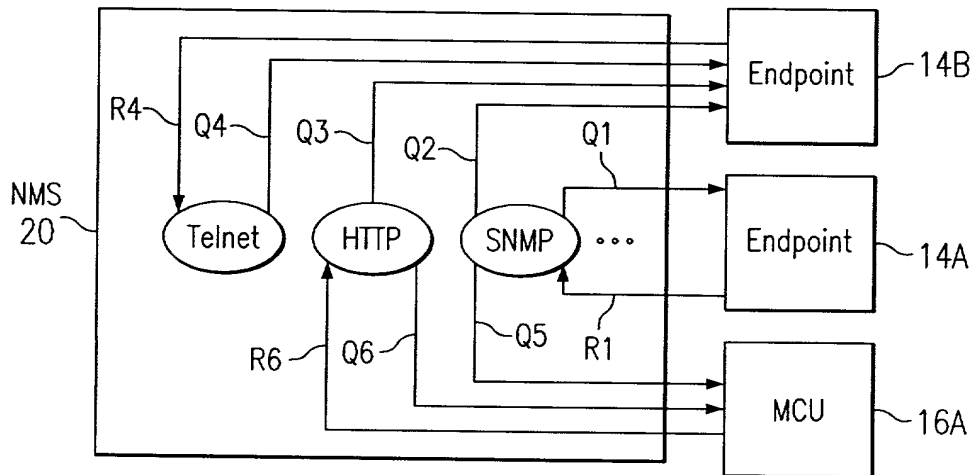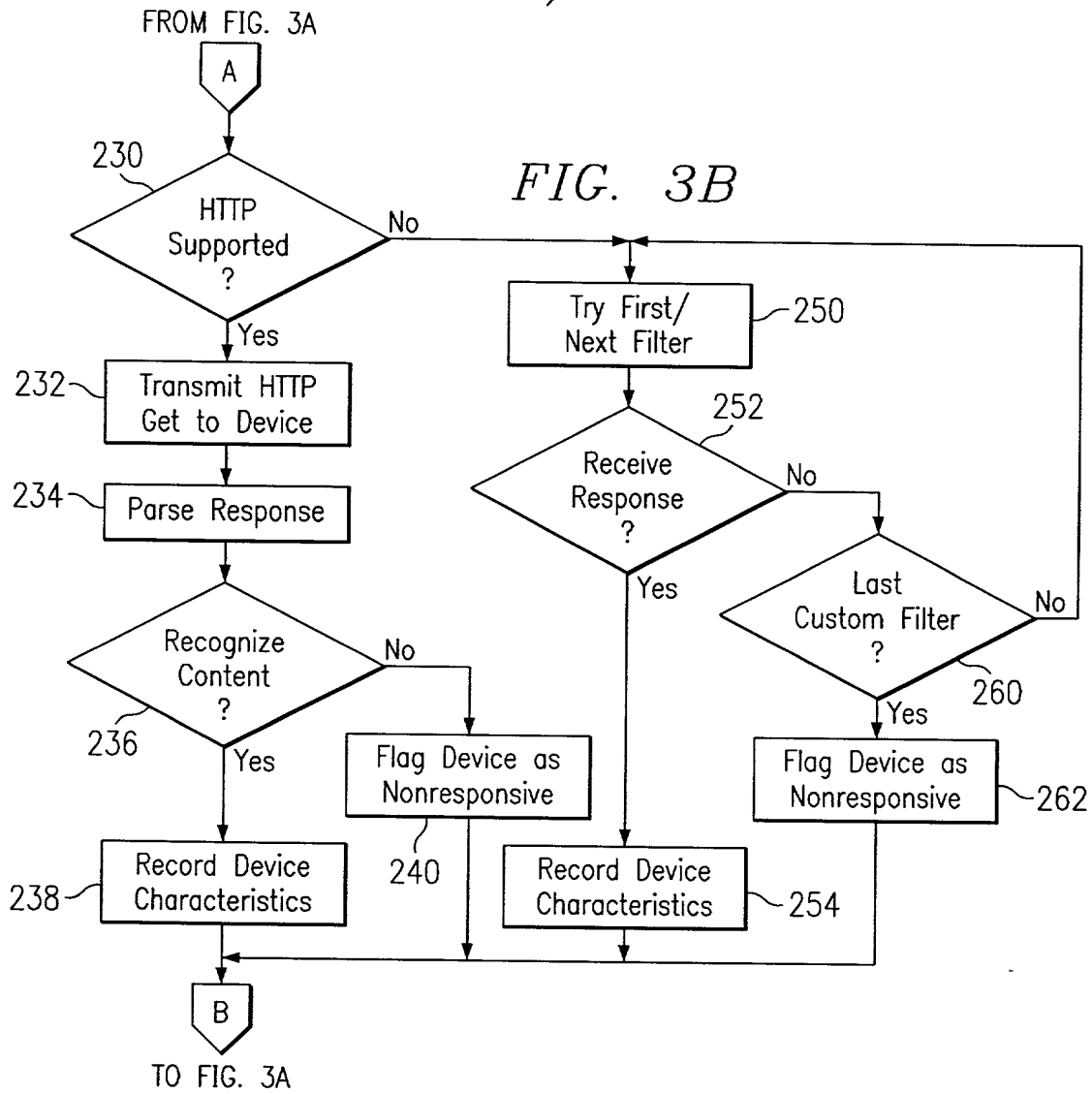Atty Docket: 021556.0136

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FIG. 3A

```
                    ( Begin )
                        |
                        v
     202 ─┐      ┌─────────────────┐
          └─────►│  Ping First/    │
                 │  Next Device    │
                 └─────────────────┘
                        |
        204             v
          ╲      ╱──────────────╲       Yes
           ╲────┤    Receive     ├──────────────┐
                │   Response ?   │              │
                ╲──────────────╱         220    v
                        │ No              ╲    ╱──────────────╲    No
                        v                  ╲──┤      SNMP      ├──────┐
     206─┐      ┌─────────────────┐           │   Supported   │      │
         └─────►│ Flag Device as  │           │       ?       │      v
                │ Nonresponsive   │           ╲──────────────╱     ┌───┐
                └─────────────────┘                  │ Yes         │ A │
                        │                            v             └───┘
                        │                                       TO FIG. 3B
                        │                    220─┐    ┌─────────────────┐
                        │                        └───►│  Use SNMP to    │◄──────────┐
                        │                             │  Query Device   │           │
                        │                             └─────────────────┘           │
                        │                                     |                      │
                        │                                     v                      │
                        │                         ╱──────────────╲      No           │
                        │                        ┤    Receive     ├──────────┐       │
                        │                        │   Response ?   │          │       │
                        │                        ╲──────────────╱           │       │
                        │                   222          │ Yes               v       │
                        │                                v            ╱──────────────╲   No
                        │              224─┐  ┌─────────────────┐    ┤     Last       ├────┘
                        │                  └─►│  Use SNMP to    │    │  SNMP Filter   │
                        │                     │  Retrieve Data  │    │       ?        │
                        │                     │  from Device    │    ╲──────────────╱
                        │                     └─────────────────┘           │ Yes    226
                        │              225─┐  ┌─────────────────┐           v
                        │                  └─►│ Record Device   │   ┌─────────────────┐   FROM
                        │                     │ Characteristics │   │ Flag Device as  │   FIG. 3B
                        │                     └─────────────────┘   │ Nonresponsive   │   ┌───┐
                        │                             │             └─────────────────┘   │ B │
                        │                             │                     │             └───┘
                        │                             │                    228
                        v                             v                     │
          No     ╱──────────────╲◄────────────────────┴─────────────────────┘
          ┌─────┤     Last       │
          │     │    Device ?    │
          │     ╲──────────────╱
          │  210        │ Yes
          │             v
          │         ( End )
          └─────────────┘
```

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FROM FIG. 3A

A

FIG. 3B

230 — HTTP Supported ?

No →

Yes ↓

232 — Transmit HTTP Get to Device

234 — Parse Response

Recognize Content ? — 236

No →

Yes ↓

Flag Device as Nonresponsive — 240

238 — Record Device Characteristics

250 — Try First/ Next Filter

Receive Response ? — 252

No →

Yes ↓

Last Custom Filter ? — 260

No →

Yes ↓

Flag Device as Nonresponsive — 262

Record Device Characteristics — 254

B

TO FIG. 3A

NMS 20

R4 Q4   Q3   Q2   Q1

Telnet   HTTP   SNMP   • • •

R6 Q6   Q5   R1

Endpoint — 14B

Endpoint — 14A

MCU — 16A

FIG. 4

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FIG. 5

Network Port **90**	RAM 100 □ 101 **82**	CPU **80**	I/O **94**

86

ROM **84**		Disk Drive 40 102 104 106 92

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